No. A-255

mecc

Picture
Chompers

Instructional Computing Courseware
for Apple® II Series Computers

A product from the
MECC Early Learning Series

This manual is compatible

with

the *Picture Chompers* disk

Version 1.x

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the purchase price of any product found by MECC to be defective
in quality or for any other reason, and which is returned to MECC,
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warranties stated or implied, including any warranty of design,
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INTRODUCTION

Young children need experiences with practicing classification skills to help them develop the concept of "this is/this is not" a member of a set. With this understanding firmly in hand, children can apply classification skills in reading, mathematics, and science. Children's early formal experiences with classifying objects begins with their extensive use of manipulatives, which gradually helps them to use written materials such as workbook pages.

The computer offers a unique opportunity for encouraging students' development of classification skills. The computer provides a rich environment where a large pool of graphics is available to children for comparison and classification. They can classify a wide variety of objects shown graphically, which would be time-consuming and sometimes impossible to assemble in a classroom. In addition, the computer can provide numerous combinations of objects, presenting familiar objects in new contexts. This helps students refine their classification skills and recognize that an object can belong to different groups.

Picture Chompers is a set of six programs designed to provide kindergarten and first-grade students with opportunities to strengthen their classification skills according to color, size, shape, design, class, and use. In addition, the programs help students sharpen their ability to visually discriminate objects.

Students can exit a program by pressing the Escape (Esc) Key whenever the program is waiting for a response. Sound may be turned on or off at any time by typing Control-S (press the S Key while holding down the Control Key).

Picture Chompers is a product from MECC's *Early Learning Series*. This series includes software packages designed for preschool to second-grade children. Each package covers a specialized topic in mathematics, language arts, or music. The following matrix outlines the products in this series.

EARLY LEARNING SERIES

Product	No.	Preschool	K	1	2
First-Letter Fun	A-154	√	√		
Fun From A to Z	A-164	√	√		
Counting Critters	A-165		√	√	
Arithmetic Critters	A-166		√	√	√
Paint with Words	A-158	√	√	√	√
Patterns	A-227		√	√	
Picture Chompers	A-255		√	√	

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THE PRODUCT AT A GLANCE

Picture Chompers

Picture Chompers	
1. Color	4. Design
2. Size	5. Class
3. Shape	6. Use

7. See Chompers Club
8. Information
9. End

Use arrows to move. Press Return.

Title: *Picture Chompers*

Grade: K - 1

Subject areas: Mathematics, pre-reading
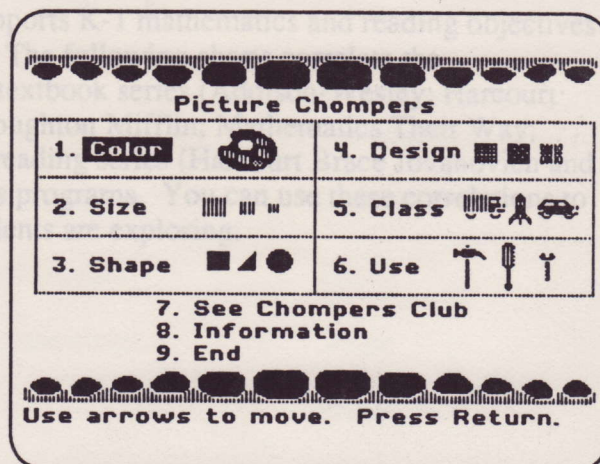
Program type: Educational game

Hardware: Apple II series computer with 128K of memory and one disk drive; color monitor highly recommended. If your students use a monochrome monitor, they should not use the **Color** program or the **Design** program.

Classroom use: Individual student

Learning objectives:
- to identify objects that are the same color as a target object
- to identify objects that are the same size as a target object
- to identify objects that are the same shape as a target object
- to identify objects that have the same design as a target object
- to identify objects that are in the same class as a target object
- to identify objects that can be used in a target activity
- to visually recognize differences and similarities in objects

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TEXTBOOK CORRELATIONS

Each of the six programs in *Picture Chompers* supports K-1 mathematics and reading objectives related to the development of classification skills. The following charts correlate the instructional objectives of seven elementary math textbook series (Addison-Wesley; Harcourt Brace Jovanovich; Holt, Rinehart and Winston; Houghton Mifflin; Mathematics Their Way; Scott, Foresman; Silver Burdett & Ginn) and two reading series (Harcourt Brace Jovanovich and Silver Burdett & Ginn) with the *Picture Chompers* programs. You can use these correlations to reinforce the specific classification skills your students are exploring.

MATHEMATICS CORRELATIONS

Addison-Wesley 1989
Mathematics (K)

Page	Objective	*Picture Chompers* Program(s)
9-10	To sort objects by color and shape and describe the set	*Color; Shape*
9-10	To classify pictures by name	*Class*
11-12	To classify pictures by design	*Design*
133-134	To classify objects as triangles, squares, or circles	*Shape*
135-136	To classify shapes as triangles, squares, or rectangles	*Shape*

Addison-Wesley 1989
Mathematics (1)

Page	Objective	*Picture Chompers* Program(s)
227-228	To identify spheres and cubes in the real world	*Shape* (hard)
231-232	To identify triangles and rectangles	*Shape*

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TEXTBOOK CORRELATIONS (continued)

Harcourt Brace Jovanovich
Mathematics Today (K)

Page	Objective	*Picture Chompers* Program(s)
13-14	To identify objects that are the same color	*Color*
15-16	To identify objects that are the same size	*Size*
17-18	To identify objects that are the same shape	*Shape*
58-58A	To identify spherical objects	*Shape* (hard)
59-60	To identify objects shaped like boxes	*Shape* (hard)
61-66	To identify circles, squares, triangles, and rectangles	*Shape*

Harcourt Brace Jovanovich
Mathematics Today (1)

Page	Objective	*Picture Chompers* Program(s)
277-278	To identify circles, squares, triangles, and rectangles	*Shape*

Holt, Rinehart and Winston 1987
Mathematics Unlimited (K)

Page	Objective	*Picture Chompers* Program(s)
4A-4B	To sort three-dimensional objects by shape (ball, box)	*Shape* (hard)
9-10	To identify same shape and same size	*Shape; Size*
23-24	To identify same color and same size	*Color; Size*
26A-26B	To determine which objects belong together	*Class; Use*
35	To identify the object that does not belong in a group of four objects	*Class; Use*

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Holt, Rinehart and Winston 1987
Mathematics Unlimited (K)

Page	Objective	*Picture Chompers* Program(s)
267-268	To recognize and identify spheres and cubes	*Shape* (hard)
269-270	To recognize and identify triangle, square, circle, and rectangle	*Shape*

Houghton Mifflin 1987
Mathematics (K)

23-24	Identify objects that are the same color	*Color*
25-26	Identify objects that are the same shape	*Shape*
27-28	Identify objects that are the same size	*Size*
29-30	Identify objects that have the same use	*Use*
145-148	Identify objects with the shape of a sphere or cube	*Shape* (hard)
151-156	Identify circles, squares, and triangles	*Shape*

Houghton Mifflin 1987
Mathematics (1)

309-312	Identify triangles, rectangles, circles, and squares	*Shape*
313-316	Identify cubes and spheres	*Shape* (hard)

Mathematics Their Way 1976

Picture Chompers reinforces the instructional objectives in **Chapter 3: Sorting and Classifying**, pages 56-87.

Scott, Foresman 1988
Invitation to Mathematics (K)

Page	Objective	*Picture Chompers* Program(s)
3-4	Identify objects that have the same shape	*Shape*
5-6	Match objects that have the same shape and size	*Shape; Size*
85-86	Identify objects that have the same shape	*Shape*

Scott, Foresman 1988
Invitation to Mathematics (1)

Page	Objective	Program(s)
229-232	Identify objects that have the same shape	*Shape* (hard)
233-234	Identify circles, rectangles, squares, and triangles	*Shape*

Silver Burdett & Ginn 1988
Mathematics (K)

Page	Objective	*Picture Chompers* Program(s)
7-8	To identify and differentiate colors	*Color*
9-10	To compare shapes of objects and tell which objects have the same shape	*Shape*
11-12	To compare sizes and tell which object has the same size as a given object	*Size*
77-78	To recognize a sphere and a rectangular prism	*Shape*
87-88	To practice recognizing rectangles and squares	*Shape*

Silver Burdett & Ginn 1988
Mathematics (1)

Page	Objective	Program(s)
281-282	To identify space shapes	*Shape*
283-284	To identify a circle, square, triangle, and rectangle	*Shape*

READING CORRELATIONS

Harcourt Brace Jovanovich 1989
Kites (K)

Page	Objective	*Picture Chompers* *Program*(s)
221-222	Classify objects	*Class*
317-318	Classify objects	*Color; Size Shape; Use*
405	Classify objects	*Shape; Class; Use*

Harcourt Brace Jovanovich 1989
Rainbows (R̄)

Page	Objective	Program(s)
44	Classify objects	*Class*
83	Classify objects	*Class*
209	Classify objects	*Color; Shape; Class; Use*
274-275	Classify objects	*Class; Use*
306	Classify objects	*Class*
340	Classify objects	*Use*

TEXTBOOK CORRELATIONS (continued)

Silver Burdett & Ginn 1989
Hickory Dickory Dock (K)

Page	Objective	*Picture Chompers* Program(s)
592	Classify objects into categories	*Class*

Silver Burdett & Ginn 1989
All Around Town (PP1)

111	Classify objects	*Color; Class*

Silver Burdett & Ginn 1989
Morning Bells (PP3)

388-389	Classifying objects according to common characteristics	*Class; Use*
422	Classifying objects according to common characteristics	*Color; Shape; Class; Use*
451	Classifying objects according to common characteristics	*Color; Class*

TEACHER OPTIONS (continued)

```
┌─────────────────────────────────────┐
│        Picture Chompers             │
│         Teacher Options             │
│ ═══════════════════════════════════ │
│                                     │
│ Select an option:                   │
│                                     │
│    1. ▐Set Number of Screens▌       │
│                                     │
│    2. See/Clear Chompers Club List  │
│                                     │
│    3. Turn joystick OFF             │
│                                     │
│                                     │
│ ─────────────────────────────────── │
│ Use arrows to move.  Press Return.  │
│ Escape: Main Menu                   │
└─────────────────────────────────────┘
```

Accessing Teacher Options

Picture Chompers contains three Teacher Options that can be accessed from the main menu by typing Control-A (hold down the Control Key and press the letter A).

```
┌─────────────────────────────────────┐
│       Set Number of Screens         │
│ ═══════════════════════════════════ │
│ You can set the number of screens   │
│ (between 1-15) that students must   │
│ complete when not using a timer.    │
│                                     │
│         1. ▐Color▌     1            │
│         2. Size        9            │
│         3. Shape       6            │
│         4. Design     10            │
│         5. Class       4            │
│         6. Use         5            │
│                                     │
│ ─────────────────────────────────── │
│ Use arrows to move.  Press Return.  │
│ Escape: Teacher Options             │
└─────────────────────────────────────┘
```

Option 1: Set Number of Screens

This option affects only games played without a timer. Using this option, you can determine the number of screens your students will play in each program.

```
     See/Clear Chompers Club List
....................................
        1. ssg        240
        2. sdz        175
        3. CK         165
        4. jw         115
        5. bd         105
        6. jmp         95
        7. SCJ         80
        8. EW          40
        9.
       10.

     Do you want to clear the
     Chompers Club List?
         Yes  No
....................................
Use arrows to move.  Press Return.
Escape: Teacher Options
```

Option 2: See/Clear Chompers Club

Students who choose to use a timer when playing *Picture Chompers*, and score high enough, can enter their initials in the Chompers Club. This option allows you to erase the current names in the Chompers Club.

```
          Picture Chompers
          Teacher Options
....................................


Select an option:

   1. Set Number of Screens

   2. See/Clear Chompers Club List

   3. Turn joystick OFF



....................................
Use arrows to move.  Press Return.
Escape: Main Menu
```

Option 3: Turn Joystick On

If students choose to play *Picture Chompers* with a joystick, you must turn this option on. NOTE: If you turn this option ON, be sure that you do **not** have a game paddle, graphics tablet, or koala pad plugged into the computer's joystick port. Also be sure that you turn the joystick **OFF** if you are not using a joystick. Otherwise, the timer might start as soon as the game screen appears.

DESCRIPTION

Picture Chompers is a graphics-based educational game for students in kindergarten and first grade that reinforces classification concepts. The challenge of *Picture Chompers* is to move a set of teeth to chomp objects that have the same color, size, shape, design, class, or use as the target described at the top of the game screen. Students may choose to play the game with or without a timer, and at three levels of difficulty. Visual feedback in the form of crunching teeth and an "X" over any incorrect chomp and aural feedback in the form of a crunching sound is provided for students who choose an incorrect answer.

Subject areas:	Mathematics, pre-reading
Topic:	Classification
Type:	Educational game
Grade range:	K - 1
Classroom use:	Individual students

LEARNING OBJECTIVES

After using this courseware, students will have received practice in:

- identifying objects that are the same color as a target object
- identifying objects that are the same size as a target object
- identifying objects that are the same shape as a target object
- identifying objects that have the same design as a target object
- identifying objects that are in the same class as a target object
- identifying objects that can be used in a target activity
- visually recognizing differences and similarities in objects

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```
·················································
~~~~~~~~~~~~~~~~~
      Picture Chompers
┌─────────────────┬─────────────────┐
│ 1. Color    ⬤   │ 4. Design ▦ ▦ ▦ │
├─────────────────┼─────────────────┤
│ 2. Size  ▐▌▐ ▎▎ │ 5. Class 🚲 🚀 🚗 │
├─────────────────┼─────────────────┤
│ 3. Shape ■ ◢ ● │ 6. Use  🔨 ⑂ 🔧 │
└─────────────────┴─────────────────┘
      7. See Chompers Club
      8. Information
      9. End
~~~~~~~~~~~~~~~~~
Use arrows to move.  Press Return.
```
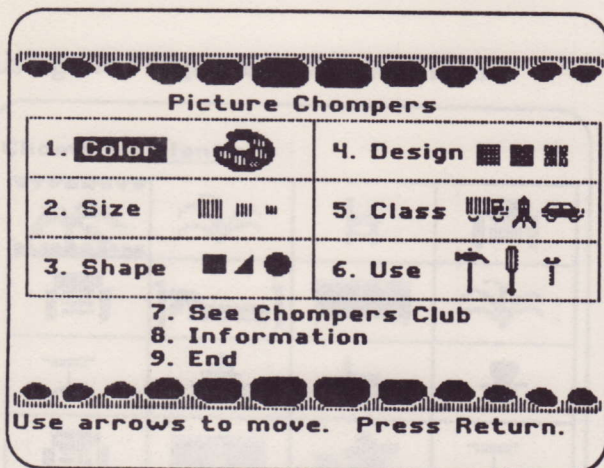
Students select a program from the main menu by moving the cursor with the Arrow Keys or by pressing the appropriate Number Key, and then pressing the Return Key.

```
~~~~~~~~~~~~~~~~~

   Choose a level:

   1. Easy      mm  ⊙⊙
                    👾

   2. Medium    mm  ⊙⊙
                    👾

   3. Hard      mm  ⊙⊙
                    👾

~~~~~~~~~~~~~~~~~
Use arrows to move.  Press Return.
```
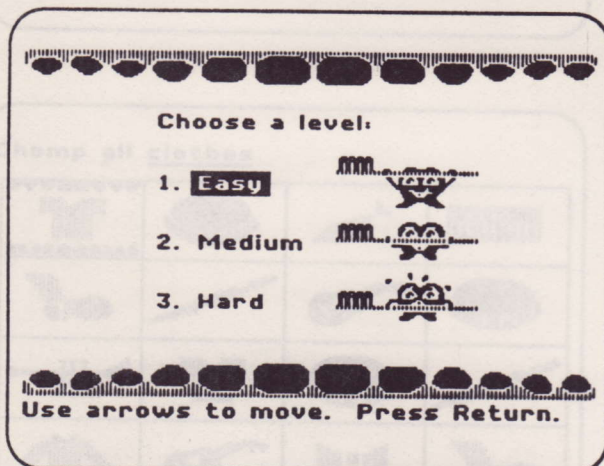
Students select a difficulty level for the game by moving the cursor with the Arrow Keys or by pressing the appropriate Number Key, and then pressing the Return Key. The relative difficulty of the molar in lifting the toothbrush is a visual indicator of the difficulty level of the game.

```
~~~~~~~~~~~~~~~~~

   Easy      mm  ⊙⊙
                 👾

   Do you want a timer?

        Yes No

~~~~~~~~~~~~~~~~~
Use arrows to move.  Press Return.
Escape: Difficulty Menu
```
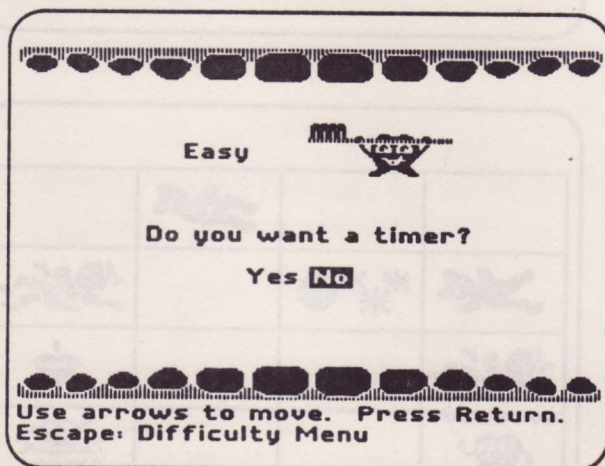
And, finally, students decide if they want to use a timer when playing the game if so, they must use the Arrow Keys to move the cursor and press the Return Key to select.

Using the Programs without a Timer

Chomp all plants
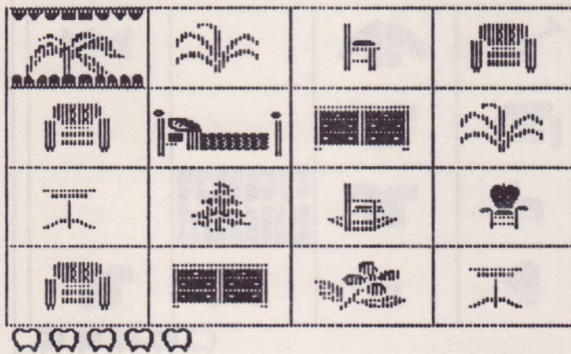
Students use the Arrow Keys, the J, K, I, M Keys, or the joystick to move the teeth around the screen. They press the Space Bar to chomp an object. At the bottom of the screen are between one and fifteen blank molars. The number of molars corresponds to the number of screens you have set for your students to play in Teacher Options (see p. 9).

Chomp all clothes
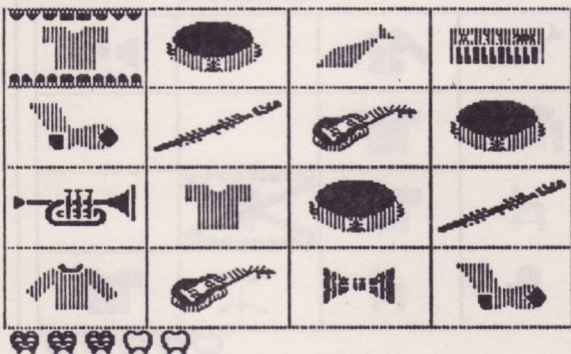
As students complete a game screen, a molar fills in as a visual reference for the number of screens they have finished and the number they have left to play. In the example at the left, the student has completed three of five assigned screens.
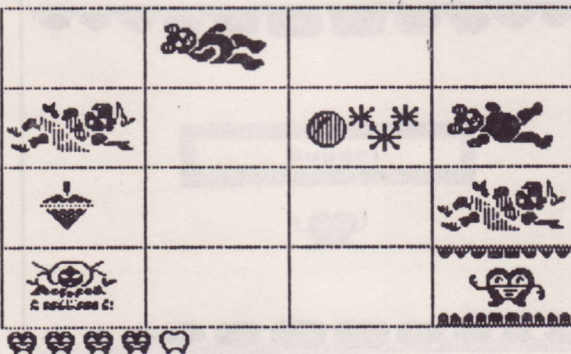
In addition to the filling molars, students receive another type of visual feedback. When students clear a game screen of all the objects that match the target, an animated molar appears in the cell where the last correct match to the target was chomped.

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Using the Programs without a Timer (continued)
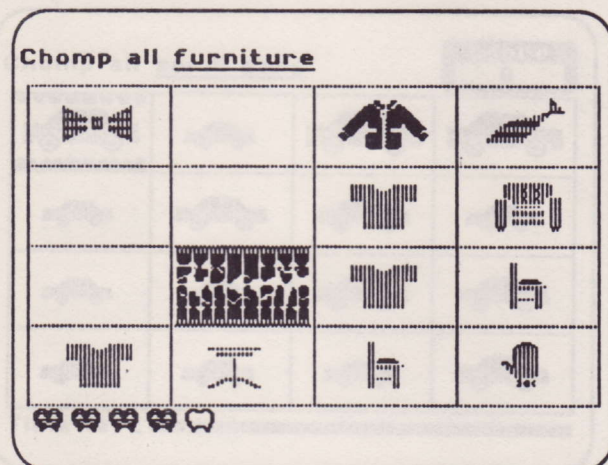
Chomp all <u>furniture</u>

If students chomp an object that does not match the target, they are given visual and aural feedback. The first time students chomp an incorrect answer, the Chomper teeth break and a crunching sound is made. When the teeth open, the incorrectly chomped object remains on the screen.
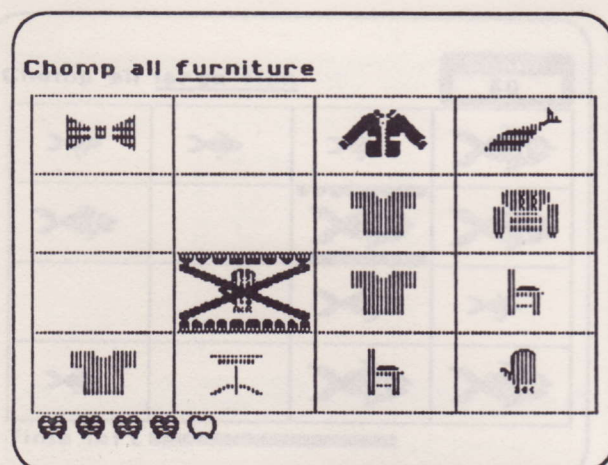
Chomp all <u>furniture</u>

If students chomp the same incorrect answer a second time, the Chomper teeth break and the crunching sound is made as in the first incorrect answer. In addition, when the teeth open, an "X" appears and remains on the object as another clue to students that their choice is incorrect. After two incorrect tries on the same object, the teeth will not chomp the object again.

Super!
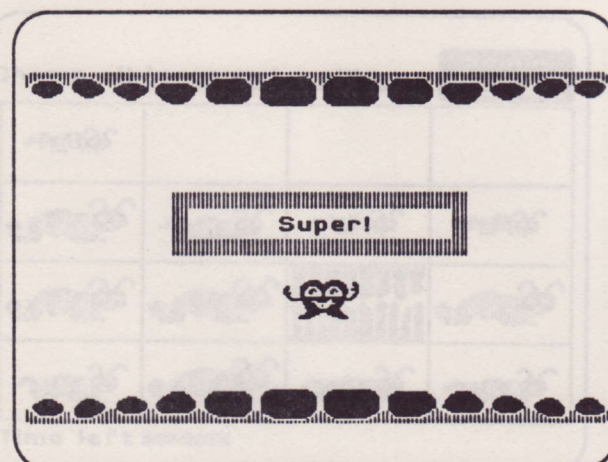
When students complete the appropriate number of screens that you have set in Teacher Option 1: Set Number of Screens (see p. 9), a visual summary screen appears. An animated molar appears and gives students a feedback message such as "Great!" or "Super!". Students are then returned to the main menu, where they can choose another program or quit the program.

Using the Programs with a Timer

Students can use the Arrow Keys, the J, K, I, M Keys, or the joystick to move the teeth around the screen. They press the Space Bar to chomp an object.
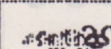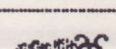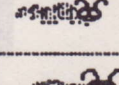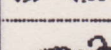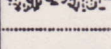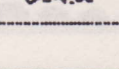
After students chomp an object that matches the target, the teeth open, and five, ten, or fifteen points (depending on the level of difficulty students have chosen) are added to their scores. Students' cumulative scores are displayed in the score box. When students clear a game screen of all the objects that match the target, an animated molar will appear in the cell where the last correct match to the target was chomped.
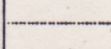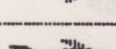

If students chomp an object that does not match the target, they are given visual and aural feedback. The first time students chomp an incorrect answer, the Chomper teeth break, and a crunching sound is made. No points are added to students' scores. When the teeth open, the incorrectly chomped object remains on the screen.

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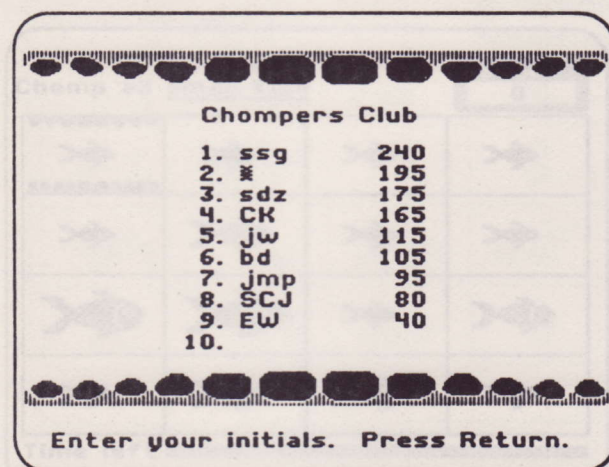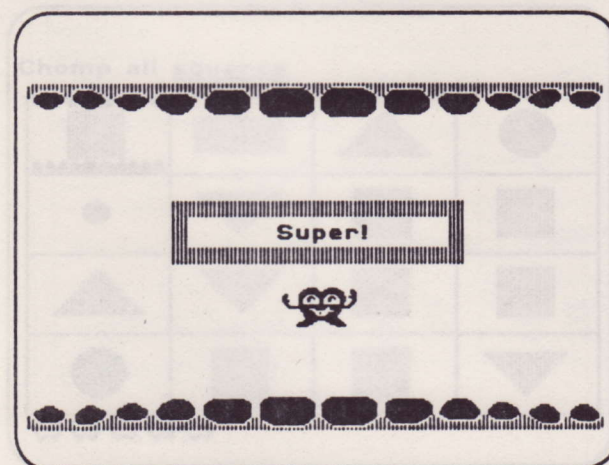
Using the Programs with a Timer (continued)
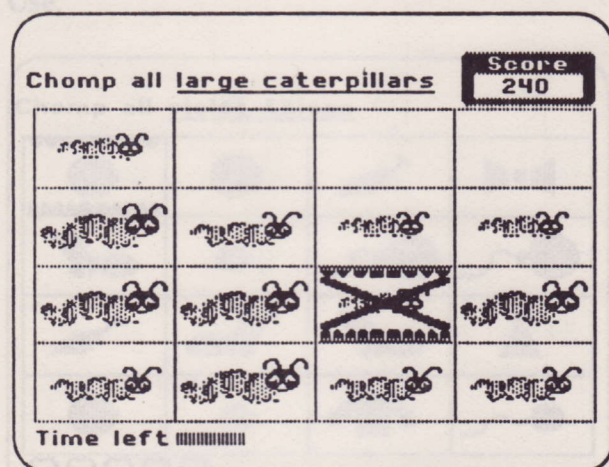
```
Chomp all large caterpillars        Score
                                      240
```

```
Time left ▊▊▊▊▊▊▊
```

If students chomp the same incorrect answer a second time, the Chomper teeth break, and the crunching sound is made as in the first incorrect answer. In addition, when the teeth open, an "X" appears and remains on the object as another clue to students that their choice is incorrect. After two incorrect tries on the same object, the teeth will not chomp the object again.

```
        Chompers Club

    1.  ssg          240
    2.  ✕            195
    3.  sdz          175
    4.  CK           165
    5.  jw           115
    6.  bd           105
    7.  jmp           95
    8.  SCJ           80
    9.  EW            40
    10.

Enter your initials.  Press Return.
```

Students may continue to play the game until the timer runs out. If their final score is higher than any score currently in the Chompers Club, an animated molar displays a message that says "Great Score," and students can then enter their initials in the Club. You can erase the initials in Chompers Club at any time using Teacher Option 2 (see p. 10).

```
        Super!
```
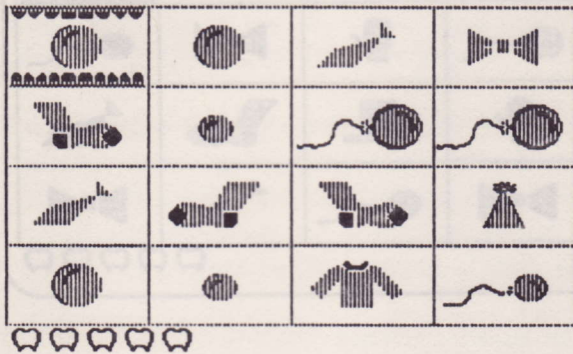
If students' final score is not high enough to qualify for the Chompers Club, the animated molar displays a message that says "Great!" or "Super!". Students are returned to the main menu, where they can choose another program or quit the program.

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CONTENT OF GAMES (continued)

Six different games are available in *Picture Chompers*: **Color**, **Size**, **Shape**, **Design**, **Class**, and **Use**.
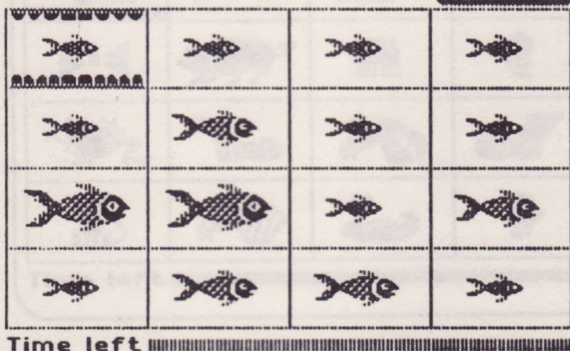
Chomp all <u>violet things</u>

Color
In this game, students move a set of teeth to chomp objects that are the same color (violet, blue, orange, or green) as the target object.
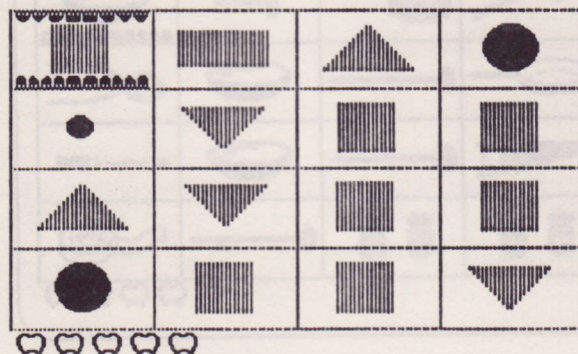
Chomp all <u>small fish</u>

Score
0

Time left

Size
In this game, students move a set of teeth to chomp objects that are the same size (small or large) as the target object.

Chomp all <u>squares</u>
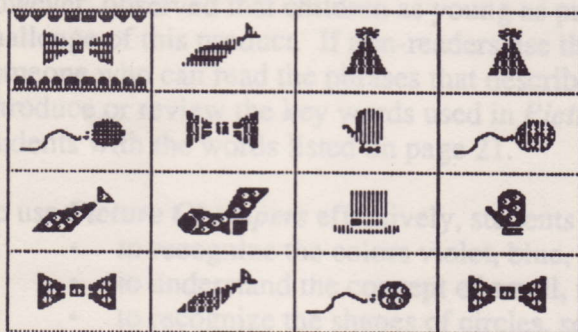
Shape
The object of this game is to move a set of teeth to chomp objects that are the same shape (circle, square, rectangle, triangle, sphere, or cube) as the target object.

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Chomp all plaid things

Design

In this game, students move a set of teeth to chomp objects that have the same design (dot, stripe, or plaid) as the target object.

Chomp all clothes

Score
0

Time left

Class

The object of this game is to move a set of teeth to chomp objects from the same class (toys, animals, vehicles, musical instruments, clothes, food, or furniture) as the target object.

Chomp all things used when building

Use

In this game, students move a set of teeth to chomp objects that can be used in each target activity (cook, write, build, paint, or play music).

USE IN AN INSTRUCTIONAL SETTING

Prerequisite Skills

Picture Chompers is a graphics-based product developed for a K-1 audience. We have, however, observed that children as young as preschoolers and as old as fourth-graders enjoy the challenge of this product. If non-readers use this product, we recommend that they work with someone who can read the phrases that describe the objects to be chomped. You might also introduce or review the key words used in *Picture Chompers* by making flashcards for your students with the words listed on page 21.

To use *Picture Chompers* effectively, students need:
- to recognize the colors violet, blue, orange, and green;
- to understand the concept of small, medium, and large;
- to recognize the shapes of circles, squares, rectangles, triangles, cubes, and spheres;
- to recognize the patterns of dots, stripes, and plaid.

Prior to using this product, students should have experience with classifying by using manipulatives. They need to recognize that an object can belong to more than one set. For example, a red button can belong to a set of red objects, circle shapes, or to a set of buttons.

Preparation

There are three variables in *Picture Chompers* that can be combined to tailor the product for your students' needs and provide a rich environment for exploring classification skills.

Timer

Students can choose to use this product with or without a timer. When students begin formalizing their classification skills, they can use this product without a timer as an exploratory activity. In this mode, students' progress is reflected in the row of molars at the bottom of the screen. (The number of molars is equal to the number of problems you set in Teacher Options; see p. 9). As students complete a screen, a molar fills and a molar character performs in the cell of the last correct answer chomped on each screen. As an exploratory activity, *Picture Chompers* can be played in a self-paced, non-pressured atmosphere.

For students who are more confident of their ability to classify objects and/or enjoy the challenge of playing against the clock, *Picture Chompers* can be used as a game. In this mode, students can interact with the pressure of a timer, receive a score and, after achieving a relatively high score, gain membership in the Chompers Club. Students can play the game until the timer runs out, accumulating 5, 10, or 15 points for each correct chomp, depending on their choice of an Easy, Medium, or Hard difficulty level. There is no point penalty for incorrect choices, but as a subtle penalty the speed of the timer increases on incorrect chomps. A maximum of ten students' initials can be listed in the Chompers Club, and you can clear the Chompers Club list by using Teacher Option 2 (see p.10).

Programs

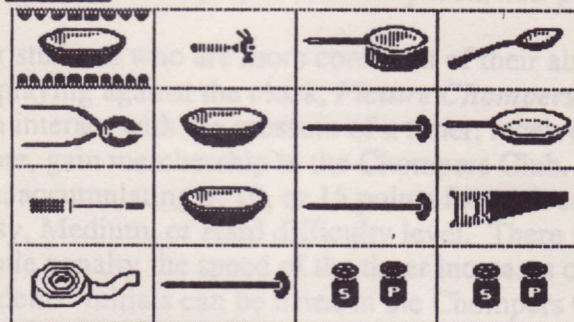The programs in *Picture Chompers* are listed in order of generally increasing difficulty for students. A suggested sequence for using the product is to have students begin with the program **Color** and then progress to the programs **Shape, Size, Design, Class,** and **Use.**

Difficulty Levels

Students can use *Picture Chompers* with three levels of difficulty represented by the relative difficulty of the molar lifting the toothbrush. As the levels of difficulty increase, the differences between the target and the distractors also increase. An example of each level of difficulty in the **Color** program is shown below:

> **Color:**
>
> | | |
> |---|---|
> | **Easy level:** | **Chomp all blue things** |
> | Target: | blue objects |
> | Distractors: | violet, green, orange objects |
> | | |
> | **Medium level:** | **Chomp all blue balls** |
> | Target: | blue balls, different sizes |
> | Distractors: | violet, green, orange balls, different sizes |
> | | |
> | **Hard level:** | **Chomp all blue balls** |
> | Target: | blue balls, different sizes |
> | Distractors: | violet, green, orange balls, different sizes, plus other spheres |

Demonstrating the Product

Before allowing students to work independently at the computer, you can demonstrate the product to the class. Direct students' attention to the phrase at the top left side of the screen. Explain to students that their task is to chomp all the objects that match the underlined phrase. Tell students that to move the teeth, they should use the Arrow Keys in the direction they want to move. To chomp an object, students need to press the Space Bar. Do several problems, demonstrating to students the result of chomping a correct target object and an incorrect distractor object.

Follow-up

As an extension of the classification skills practiced in *Picture Chompers*, students can create a classification book. They can cut pictures from magazines or collect actual objects, such as buttons, and paste them either in a book devoted to a single category or in one containing several categories. Students could also trace and color some objects, such as keys, blocks, and leaves, to include in their books. Students can individually create a classification book or work cooperatively on a collaborative project.

The certificate on page 23 can be duplicated and awarded to students as a reward for successfully using *Picture Chompers*.

PROGRAM VOCABULARY

Color

1. orange
2. green
3. blue
4. violet
5. balloons
6. balls
7. ties
8. mittens
9. shirts
10. hats
11. socks
12. things

Size

1. small
2. large
3. pencils
4. shoes
5. cars
6. caterpillars
7. beds
8. crayons
9. brushes
10. hammers
11. fish
12. pens

Shape

1. triangles
2. circles
3. squares
4. rectangles
5. balls
6. boxes
7. triangle shapes
8. circle shapes
9. square shapes
10. rectangle shapes
11. ball shapes
12. box shapes

Design

1. dots
2. plaid
3. stripes
4. balloons
5. balls
6. ties
7. mittens
8. shirts
9. hats
10. socks

Class

1. toys
2. animals
3. cars
4. trucks
5. musical instruments
6. plants
7. clothes
8. food
9. furniture
10. farm animals
11. fruit
12. vegetables
13. flowers
14. vehicles that fly
15. vehicles
16. animals that fly
17. animals that like to swim
18. pets

Use

1. things used when writing
2. things used when cooking
3. things used when building
4. things used when painting
5. things used when playing music

Student Progress Report for *Picture Chompers*

Student Name	Program	Level	Timer

mecc

This is to certify that

has done a superior job in classifying objects.

PICTURE CHOMPERS

Teacher _____

CREDITS

The MECC team responsible for the development of *Picture Chompers* includes Sheila Dols, Scott Jensen, Charolyn Kapplinger, Sherry Luedloff, Jane Peterson, Elizabeth Wendland, John P. Wlazlo, and Stephen Zehm.

The development team greatly benefited from the efforts of the MECC team that designed the original Chompers programs found in the **Conquering Math Series** products. These programs include **Fraction Chompers** from *Conquering Fractions (+,-)* and *Conquering Fractions (x,÷)*; **Decimal Chompers** from *Conquering Decimals (x,÷)*; and **Percent Chompers** from *Conquering Percents*.

The team also thanks Miryam Acevedo-Bouchard for the content expertise she contributed to the product.

MECC extends a special thanks to the following teachers and their students for their assistance in the development of this product:

> Nel Rindels
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> Nancy Friendt
> Diane Lemkuhl
> Chippewa Kindergarten Center
> North Oaks, Minnesota

TO THE READER:

MECC has made every effort to ensure the instructional and technical quality of this courseware package. Your comments—as user or reviewer—are valued and will be included in any future revision of the product. Please address comments to:

<div align="center">

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</div>

MECC SERVICES

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  3) write or call the Help Line to describe the problem.

For information on all the above items, use the MECC General Information telephone number: 612/481-3500.

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